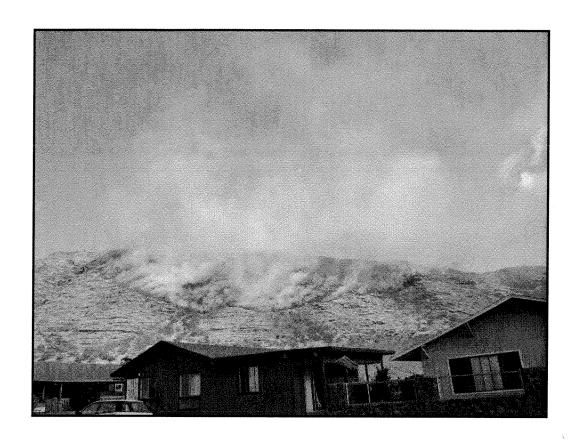
# **Annual Report**

Grant No. 04-DG-11052012-094 Fiscal Year 2004-2005





Prepared for USDA – U.S. Forest Service Fire & Aviation Management – Region 5

Ву

Wayne F. Ching State Protection Forester DLNR – Division of Forestry and Wildlife

### I. State Fire Assistance Program (SFA)

A. Goal. To provide protection for forest, brush, natural areas, and grassland to the extent needed to hold fire damage below the level at which it would interfere with high-level, sustained yield of products and services from these lands.

#### B. Objectives.

1. Provide fire protection coverage on 3,360,000 acres throughout the State.

#### a. **PREVENTION**

<u>Mission</u>. To minimize man-caused fires by improving DOFAW's prevention program via training, technical assistance, and utilization of contemporary techniques for public education measures.

Fully attained.

#### **Accomplishments**

- 1) Smokey Bear made an appearance at the Kauai Farm Fair as well as at Project W.E.T. (conducted by the Kauai County Water Department). Both events were attended by approximately 1,500 adults and children.
- 2) Continued to promote and handout Fire Prevention materials and brochures to the public at the Administrative and Branch offices.
- 3) Participated in the Makawao Rodeo 4<sup>th</sup> of July Parade. Approximately 5,000 to 8,000 spectators witnessed the event. DOFAW's float won 1<sup>st</sup> place in the 'Best Organization' category. Master of ceremonies for the parade delivered a brief fire prevention message to the crowd. Eleven volunteers joined our efforts.
- 4) Participated in the Maui County Fair Parade (September 30, 2004) to promote fire prevention and the Smokey Bear campaign. Approximately 10, 000 spectators witnessed the event. Smokey Bear made an appearance at the parade as well as greeted visitors at the fairgrounds. Approximately 25,000 people were present to meet Smokey during the two-day event.
- 5) Participated in the 2004 Maui Fire Prevention Week show conducted by the Maui County Fire Department on Oct.14, 2004. DOFAW displayed its gamma goat fire suppression vehicle and its ability to operate under adverse conditions. Approximately 300 school children were present for the show.
- 6) The Maui Branch Protection Forester and the Hawaii Firewise Coordinator attended the National Firewise Workshop held in Denver, CO on Nov.3-5, 2004. Both participants were exposed to interesting brush and fuel reduction projects that are currently taking place in parts of the U.S. There were also introduced to new software that assist fire planners in fire hazard assessments, fire prevention education, fire suppression activities, etc. Attending the workshop will help us reach our goals for the Hawaii Firewise program.
- 7) Smokey made an appearance at the elementary schools on Hickam, Schofield, Kaneohe Marine Corps, and Pearl Harbor military bases with assistance from the Federal Fire Department during Fire Prevention Week. Smokey charmed the more than 2,500 adults and children that attended the events at the various bases.
- 8) The Kohala By The Sea community on the Big Island was given national recognition as the 50<sup>th</sup> community in the nation to achieve Firewise Communities USA status.

- 9) DOFAW contracted the services of a Firewise Coordinator who oversees the statewide Firewise program. Forty-seven communities have benefited from this effort.
- 10) Smokey celebrated his 60<sup>th</sup> birthday at the Administrative office by visiting with dignitaries from the Department of Land & Natural Resources as well as meeting with Pacific Southwest Research Station scientists and personnel. A cake and congratulatory message was presented to Smokey for continuing to spread his message on fire prevention.
- 11) Smokey Bear made an appearance at the Volcano Village 4<sup>th</sup> of July Parade on the Big Island. It was attended by approximately 1000 people. Smokey Bear also made 3 appearances at 3 Waimea schools in conjunction with Fire Prevention Week. Approximately 150 students were present.
- 12) Participated in "A Day at Lake Wilson" event; provided Firewise information to the participants. Approximately 1,250 participants & visitors attended the event.
- 13) Participated in the Manoa Eco-Fair in October, emphasizing Firewise and watershed fire protection. Approximately 800-1000 participants attended the event.
- 14) Attended the Waimea Town Celebration and Kamehameha Schools Anahola Preschool to pass out brochures and Smokey Bear items. Events were attended by approximately 1,500 people.
- 15) Worked with the Maui Electric Company on FLIR missions to survey power lines and poles in the Ukumehame section for any 'weak' equipment or connections as well as monitored vegetation surrounding power line poles in the Ukumehame sector.
- 16) Managed a fire prevention booth at the Maui Earth Day Fair at the Maui Nui Botanical Gardens on April 23, 2005. Approximately 1500 people attended the fair and viewed numerous fire prevention materials.
- 17) Removed 'Smokey Bear Dry Area' signage from Kula State Forest Reserve access points due to low fire hazard conditions. Maui DOFAW is currently using fire danger rating outputs, specifically KBDI and fuel moisture readings as a management tool to guide fire prevention and presuppression activities.
- 18) Participated in the 2005 Lahainaluna High School Career Day Fair held January 20, 2005. Displayed fire prevention materials along with other forestry and wildlife interests and issues. Approximately 1,000 students attended the event and viewed the prevention material.

#### b. **PRESUPPRESSION**

<u>Mission</u>. To minimize man-caused fires by improving DOFAW's prevention program via training, technical assistance, and utilization of contemporary techniques for public education measures.

#### **Accomplishments**

Fully attained.

- 1) Maintained 47 miles of fire breaks in the Puu Ka Pele Forest Reserve, Kauai.
- 2) Maintained 51 miles of firebreak in Puu Waawaa, Hawaii through chemical control.
- 3) Grazed 25,000 acres of fountain grass to reduce the fuel hazard in Puu Waawaa, Hawaii.
- 4) Reduced fuels in 20 acres of Kipuka Oweoweo in Puu Waawaa through weedeating and herbicide applications. Installed a water tank in Kipuka Oweoweo for fire suppression.

- 5) Continued to input Kula State Forest data for FireFamily weather monitoring.
- 6) Inspected fire danger in the Kuaokala Game Management Area (Oahu) and Kula Forest (Maui) due to increasing KBDI numbers.
- 7) Continued to input fire reports into agency database files.
- 8) Updated the existing Memoranda of Understanding with all four county fire departments as well as the Nature Conservancy of Hawaii.
- 9) Continued to conduct field exercises with DOFAW Branch personnel on fire vehicle and pump operations.
- 10) Continued to collect monthly rain gauge, temperature and traffic tally readings at the Kula State Forest Reserve.
- 11) The State Protection Forester and the Oahu Branch Manager conducted the I-100 and I-200 course for employees of the Departments of Land & Natural Resources, Health, and Agriculture as well as employees of the U.S. Fish & Wildlife Service in November. Thirty-two students attended.
- 12) Continued to monitor RAWS data statewide.
- 13) Participated in the Drought Mitigation meetings held statewide. Assisted the Health and Safety committee on completing the first drafts for several high priority fire presuppression projects.
- 14) Prepared a fire management plan for the Waianae Kai Community Forest Project in September.
- 15) Delivered a presentation of the Mohala I Ka Wai-Firewise and WKCFP Fire Management Plan at the Waianae Community Center in September. Approximately 50-75 people attended the event.
- 16) Presented a fire prevention/presuppression/suppression power point presentation at the Pu'u O Hoku Ranch workshop on Oct. 22, 2004 on Molokai. The workshop was created to educate future homestead landowners on different issues associated with managing tree plantations. Approximately 30 individuals were present.
- 17) The Maui Branch DOFAW worked in cooperation with the Division of State Parks in removing hazardous trees and other potentially hazardous fuels surrounding the Polipoli cabin area. DOFAW fallers removed nearly all potentially hazardous trees (40-50 trees) around the cabin facilities to mitigate dangerous conditions. Skills and knowledge acquired from the past chainsaw trainings have proven beneficial to both operations and personnel safety. We are currently working with cooperators to maximize the use of green material and timber.
- 18) Drafted a Kula fuel reduction and road maintenance plan and began minor operations with DOFAW fallers. Continue to work on Kula Road maintenance and fuel reduction project. Also, working with local logger to see if it would be feasible to fall and purchase trees from DOFAW. The plan is to have the logger remove the timber for a specified price. Inspected the Kula access road with the DOFAW Administrator to view current hazardous fuel situation along the corridor.
- 19) Attended the Molokai Wildfire Task Force team meetings held on Sept. 27, 2004, Oct. 19, 2004 and Nov.8, 2004 in Molokai's TNC office. Representatives from DOFAW, MFD, Soils Conservation, DHHL, TNC and private equipment operators were present. The group discussed future fire management strategy plans for suppression activities and partnerships. The area of focus is on the south shore of Molokai from Kawela to Kalamaula. Historically, the large Molokai fires have taken place in this general area.

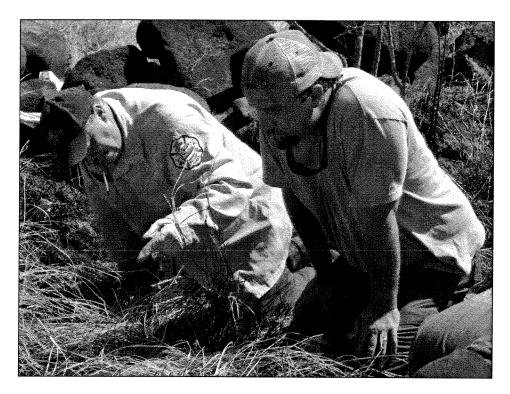
- 20) Working with Debbie Kelly of NRCS Molokai and Molokai Task Force team to produce a fire hazard assessment mapping program and wildland fire awareness program for Molokai. These ideas were a result of the connections made at the FireWise workshop in Denver, CO.
- 21) Continued to work on Critical Annual Fire Refresher scheduling and teaching assignments. During its annual safety briefing in December, the Oahu Branch included a fireline safety session using the current training package, i.e. Risk Management-10/18/LCES.
- 22) Conducted and attended the annual DOFAW Fire Managers Core Group meeting on Maui (Aug. 26-27, 2004) in conjunction with the Forestry Managers Core Group meeting. Topics covered were upcoming fire training schedule, fire budgets FY'05, SFA, VFA, FEPP, fire reporting system, etc.
- 23) A Statewide FEPP program review was completed in November, 2004. Members of the review team included R5 Property Mgmt. Specialists Sadie Johnson and Desi Preston, Co-op Fire Asst. Director Dennis Orbus and State Protection Forester Wayne Ching.
- 24) The Oahu Branch Manager represented DOFAW at the R5's Centennial Forum in Sacramento, CA in November with delegates representing all government levels, NGO's, and private citizens. He provided insight into Hawaii's history regarding fire management and its close relationship with the FS's organizational mission, i.e. watershed management, fire protection, and public safety.
- 25) Updated Maui Branch fire suppression vendor list.
- 26) The Maui Branch received two new Honda Ultra Striker portable pumps, neck shrouds, two 1500 gal. Snap Tank portable tanks, two 72 gal. Heli tanks and one 125 gal. Slip-on unit.
- 27) Updated PPE's for DOFAW personnel. This included firepacks, new generation fire shelters, and fire boots.
- 28) Assisted Maui County Fire Dept. in conducting the Pack Test for the county firefighters who had passed the S130/S190 wildland fire training course in June 2004. The Pack Test was conducted on July 7, 2004.
- 29) Continued on working in incorporating GPS/GIS technology into forestry and fire operations.
- 30) Continued vegetation control in and around fenced RAWS locations.
- 31) Fire training records were updated for all DOFAW employees.
- 32) The annual refresher was conducted on all four DOFAW branches to all firefighting personnel.
- 33) Attended meetings as part of the Maui and Big Island Wildfire Coordinating Groups.
- 34) The State Protection Forester and the Kauai Protection Forester attended the California/Nevada/Hawaii Forest Fire Council meeting in Reno, NV in October. The State Protection Forester made a presentation of the 2004 Spring CNH meeting which was held on Kauai in April. He was also a part of a panel that discussed the topic, "What are we doing, where are going, and how do we get there."
- 35) Worked with R5 staff on the training schedule for Spring 2005 for Hawaii.
- 36) Two DOFAW representatives attended the 26<sup>th</sup> Annual Conference of the Hawaii Fire Chiefs Association in Kapalua, Maui on Nov. 12-13, 2004. The Maui Branch Forestry Manager made a presentation. The attendance by DOFAW provided a balanced support of fire fighting leadership in Hawaii and gave impetus for changing the format and content of the annual confab.
- 37) The DOFAW Fire web site (<u>www.state.hi.us/dlnr/dofaw/fmp</u>) was maintained and periodically updated during this period.

- 38) Statewide fire caches were updated and maintained.
- 39) Continued to perform fuel hazard reduction activities in and around T&E plant enclosures on the island of Hawaii.
- 40) Maintained all RAWS sites statewide.
- 41) The State Protection Forester attended the annual USFS Fire Managers meeting in San Diego, CA on Oct. 26-28, 2004.
- 42) The DOFAW Fire Cadre conducted two 130/190 courses during this period. The first was held on Kauai on December 6-10, 2004. Thirteen students attended the course representing the Kauai Fire Department, the Nature Conservancy of Hawaii, and DOFAW. The second was held on Maui on May 16-20, 2005. Twenty-four personnel attended the course representing the National Park Service, DOFAW, Maui Fire Dept., and Americorps.
- 43) Met with NPS Pacific Island Fire Management Officer Joe Molhoek to draft a new Mutual Aid Agreement between the two agencies. We also talked about call-out protocol for both NPS and DOFAW personnel. As a result, a call-out procedural plan was drafted for the Maui Branch IMT.
- 44) Assisted the USFS Fire Assessment Team (led by Russ Gripp) with historical and localized knowledge of Maui's fuel types, weather conditions and fire behavior. Guided fire assessment team on fuel mapping field trips to verify fire program model outputs. Also, logistical and planning support was provided for the team during their stay on Maui from Dec.6-17, 2004.
- 45) Attended a fire fuels mapping workshop at the Pacific Disaster Center (PDC) on Maui to discuss current and future fire fuel mapping techniques and modeling needs that would be of most benefit to the majority of the fire community.
- 46) Four workshops were conducted by R5 personnel.
  - a. The S-215 (Lead instructor Mark Vardenega) was held in Hilo on February 14-18, 2005. Thirty-one students attended, representing DOFAW, NPS, USFWS, Hawaii County Fire Department. There was one student from the Colville National Forest.
  - b. The FI-210 (Lead instructor Paul Steensland) was held on Maui on March 14-18, 2005. Twenty students attended, representing DOFAW, NPS, Hawaii County Police Dept., Maui County Fire Dept. and Honolulu Fire Dept.
  - c. The S-200 and S-336 (Lead instructor Mark Nunez) were held in tandem. The courses were held on Maui on April 18-22, 2005. Twenty-nine students attended, representing DOFAW, NPS, and Maui Fire Dept. Two students from Saipan were also in attendance.
  - d. The "C" Chainsaw workshop (Lead instructor Doug Dent) was held on Maui on April 11-15, 2005. Eleven students attended, representing DOFAW, USFS, and the Maui Fire Dept.
- 47) Four DOFAW personnel participated in a prescribed fire project in the Cleveland National Forests on May 31-June 3, 2005. They were hosted by John Truett. The knowledge and experience gained by this participation will aid in the successful establishment of a prescribed fire program for DOFAW.
- 48) Met with a representative from the Big Island RC&D to discuss Firewise presentations for several East Hawaii communities.

## c. <u>SUPPRESSION</u>

1)	During this reporting period, DOFAW was involved in two small fires, one on the Big Island (lacre) and 4
	fires on Kauai (40.2 acres).

2) The fire database was updated during this grant-reporting period.



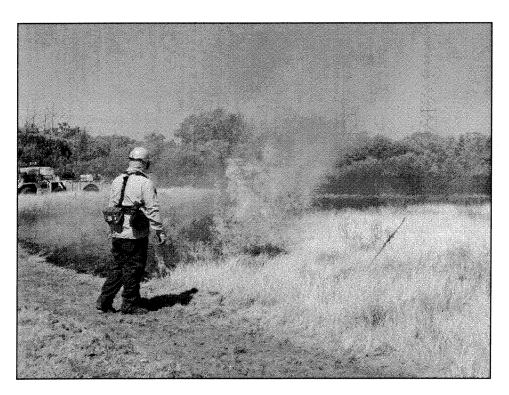
(Feb. 2005) Pohakuloa Fire Dept. Firefighter Warren Hahlbeck and DOFAW Wildlife Biologist John Polhemus work together in determining the cause of a wildfire. The one-week course introduced students to the intricacies of what goes on in a fire investigation.



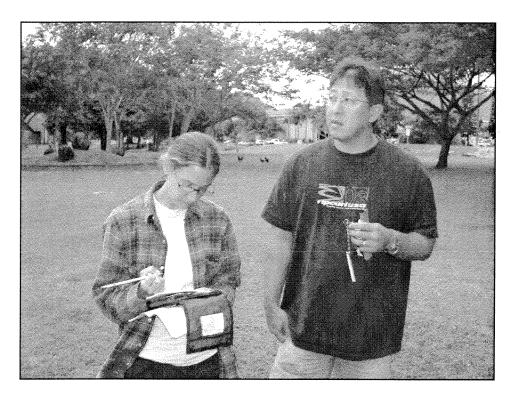
The DOFAW Fire Cadre and Forestry Managers convened a meeting in August 2004 on Maui. The annual core group meeting brings the DOFAW professional forestry staff together to work on issues that determines the success of the Division.



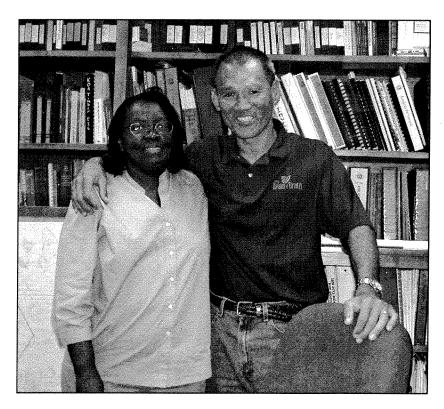
(April 2005) The Hawaii County Fire Dept. (HiCFD) recruit class of 2005 go through the After Action Review process after performing line construction duties. The State Protection Forester was invited to review the wildfire training program.



Hawaii Branch Protection Forester Jay Hatayama demonstrates firing techniques after the HIFCD recruits constructed a handline.



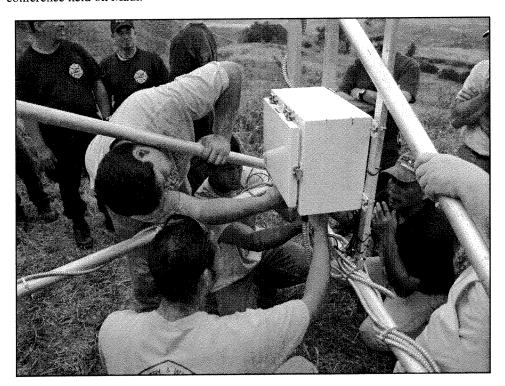
(Jan. 2005) Kauai DOFAW personnel Sherri Paul and Craig Koga take weather readings as part of the annual refresher critical fire training.



(Nov. 2004) Region 5 Property Manager Sadie Johnson poses with State Protection Forester Wayne Ching. Sadie has been a tremendous help in the success of Hawaii's FEPP program. We wish her well in her retirement.



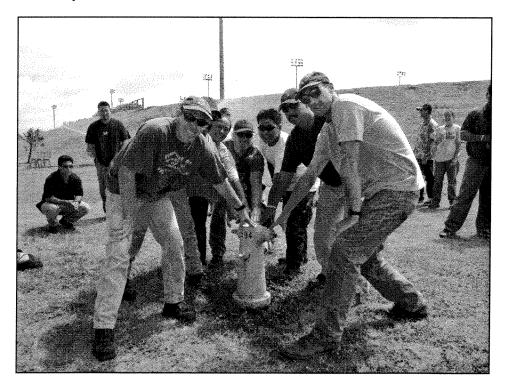
(Nov. 2004): DOFAW employees relax after a grueling day in the classroom! These folks were providing logistical support to the Hawaii Association of Watershed Partnership conference held on Maui.



(May 2005) Students get familiarized with the hardware of a RAWS station at Schofield Barracks, Oahu. USFS Lead Instructor Linnea Keating was instrumental in conducting a workshop to update federal and state agencies who are charged to provide maintenance on over 35 RAWS statewide.



(Dec. 2004) The Kauai Fire Dept. Recruit class of 2005 work on an exercise during the S130/190 workshop. The workshop also included students from DOFAW, and the Nature Conservancy of Hawaii.



(May 2005) Students prepare themselves for a hose-lay competition during the S130/190 workshop on Maui. Students included members from the Maui County Fire Dept., National Park Service, Americorps, West Hawaii Watershed Partnership, and DOFAW.